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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/561,079	02/09/2006	Harmannus Franciscus Schoo	0064.24	6057
25871	7590	10/02/2009		
SWANSON & BRATSCUN, L.L.C. 8210 SOUTHPARK TERRACE LITTLETON, CO 80120			EXAMINER LUU, THANH X	
			ART UNIT 2878	PAPER NUMBER
			NOTIFICATION DATE 10/02/2009	DELIVERY MODE ELECTRONIC

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

efspatents@sbiplaw.com

<b>Office Action Summary</b>	<b>Application No.</b> 10/561,079	<b>Applicant(s)</b> SCHOO ET AL.	
	<b>Examiner</b> Thanh X. Luu	<b>Art Unit</b> 2878	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 21 September 2009.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-4 and 7-28 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4 and 7-28 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 16 December 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☒ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on September 21, 2009 has been entered. Claims 1-4 and 7-28 are currently pending.

### ***Specification***

2. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

### ***Priority***

3. Acknowledgment is made of applicant's claim for foreign priority based on an application filed in the Netherlands on 06/17/2003. It is noted, however, that applicant has not filed a certified copy of the 1023680 application as required by 35 U.S.C. 119(b). A copy of the foreign priority document has not been received from the International Bureau.

### ***Claim Rejections - 35 USC § 112***

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. Claims 7, 12, 24, 25 and 27 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

6. Regarding claim 7, "the reference module" lacks proper antecedent basis.

7. Regarding claim 12, it is unclear how the plastic carrier material is related to the single

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flexible carrier material already claimed.

8. Regarding claim 24, "the reference module" lacks proper antecedent basis. Further, it is unclear how a carrier material is related to the single flexible carrier.
9. Regarding claim 25, "the waveguide" lacks proper antecedent basis.
10. Regarding claim 27, it is unclear how the carrier material is related to the flexible carrier.

***Claim Rejections - 35 USC § 103***

11. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

12. Claims 1, 2, 3, 7, 13, 14, 16-26 and 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Saaski (U.S. Patent 6,082,185) in view of Bradley et al. (WO 02/42747).
13. Regarding claims 1, 2, 3, 7, 16, 19-24, 26 and 28, Saaski discloses (Figs.) an optical sensor and method of manufacturing such a sensor, comprising a fully disposable detection module, with detection module comprises a light source (91) and a detector (93) for measuring emitted light which reaches the photodiode via a sample holder (channel 11, 86), the sample holder containing an active layer (37) of which an optical property changes when the active layer is in contact with a component to be measured, and the sensor being of a reflective type (Fig. 7B), wherein the light source, the detector and the sample holder are all situated on or in a single flexible carrier material (12). Saaski further discloses an array of optical sensors (D1-D3) and a cover (16). The other (D2 or D3) can be called a "reference module". Saaski does not disclose that the light source is an organic LED or the detector is a photodiode. Bradley et al. teach (pg. 8) using printed organic LEDs and photodiodes. It would have been obvious to one of ordinary skill in the art at the time the invention was made to provide organic LEDs and

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photodiodes in the apparatus and method of Saaski in view of Bradley et al. to obtain low cost and easy to manufacture light sources and detectors as taught.

14. Regarding claims 13 and 14, Saaski in view of Bradley et al. disclose the claimed invention as set forth above. Saaski and Bradley et al. do not disclose the specific type polymer LED or detector as claimed. However, LEDs and detectors made of such polymer materials are well known and conventional. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made provide such types of polymer LED or detector in the device of Saaski in view of Bradley et al. to obtain smaller, lighter and more cost efficient devices as known.

15. Regarding claims 17 and 18, Saaski in view of Bradley et al. disclose the claimed invention as set forth above. Saaski and Bradley et al. do not disclose the specific type of active layer as claimed. However, choosing a particular type of active layer is a matter of design choice and is dependent on what type of measurement is desired. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to choose a particular type of active layer to obtain a desired measurement in the apparatus of Saaski in view of Bradley et al.

16. Regarding claim 25, Saaski in view of Bradley et al. disclose the claimed invention as set forth above. Saaski and Bradley et al. do not disclose injection molding to form a waveguide as claimed. However, injection molding waveguides are well known. It would have been obvious to one of ordinary skill in the art at the time the invention was made to choose injection molding a waveguide in the apparatus of Saaski in view of Bradley et al. to cost effectively and reliably form a waveguide as known.

***Allowable Subject Matter***

17. Claims 4, 8-12, 15 and 27 are objected to as being dependent upon a rejected base

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claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Response to Arguments***

18. Applicant's arguments with respect to the claims have been considered but are moot in view of the new ground(s) of rejection.

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thanh X. Luu whose telephone number is 571-272-2441. The examiner can normally be reached on M-F 6:00AM-3:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Georgia Epps can be reached on 571-272-2328. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Thanh X Luu/  
Primary Examiner, Art Unit 2878